Environmental Bulletin

Volume 18, Number 2
February 9, 2007

from the Savannah River Site

SRS Facility Deactivation & Decommissioning Project Update

In August 2003, the U.S. Department of Energy and the Washington Savannah River Company (WSRC) embarked on an effort to accelerate Deactivation and Decommissioning (D&D) at the Savannah River Site, adding approximately 240 buildings to the contract. These facilities were largely in inactive areas of the site or were no longer needed to support site activities and represented an unnecessary surveillance and maintenance requirement. The buildings were primarily in D, F, M, and T Areas. As of November 30, 2006, the decommissioning of all but one of the buildings (211-F) has been completed. D&D activities successfully supported the closure of T Area, the first industrial area closure at SRS. Additionally all of the D&D required for closure of M Area, the next area scheduled for closure, was completed. In D Area, all of the inactive process buildings have been decommissioned leaving only the operational power house complex. Over 50 buildings were decommissioned in F Area, including the Naval Fuels (247-F) Complex. With the backlog of inactive facilities cleared, future D&D work will now focus on supporting the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) Area Completion process and ongoing risk reduction actions in F Area. The D&D scope for FY2007 includes the following:

P-Area Decommissioning: P-Area includes one of the five reactor facilities at SRS. The Reactor started up in February 1954 and was placed in shutdown in 1991. The Reactor will be decommissioned as part of the P-Area Operable Unit and will be the first SRS reactor to be decommissioned. Decommissioning activities will include issuing a CERCLA Interim Action Proposed Plan for the Decommissioning of the P Reactor. This document will describe end state alternatives for P Reactor and will culminate in an Interim Record of Decision for the Reactor End State. This Interim Record of Decision will then be incorporated into the final Record of Decision for the entire P-Area. Look for a future SRS *Environmental Bulletin* dedicated to this effort. In addition to the Reactor, several ancillary facilities P-Area facilities will be decommissioned. These are:

· 105-1P, No. 2&5 Deionizers Pad
· 105-6P, Change Facility – Deionizer Section
· 105-13P, Heavy Water Storage Facility
· 110-P, Helium Storage Facility
· 151-1P, Primary Substation (High Volt 115/13.8)
· 151-2P, Primary Substation (High Volt 115/13.8)
· 608-P, RZ Change Facility
· 701-1P, Area Gatehouse and Patrol Headquarters
· 710-P, RZ Storage Facility
· 717-9P, Pipe Fabrication Shop

Building 105-P

Other D&D activities in 2007 will include planning for the F-Area Material Storage Facility through the development of a D&D Safety Basis and development of a CERCLA Interim Action Proposed Plan. Decommissioning of the 211-F facility will also be completed.

Update on Decommissioning EE/CA's

To date, DOE-SR has identified three facility decommissioning projects that require use of the CERCLA non-time-critical removal action process. The process requires that a Removal Site Evaluation Report/Engineering Evaluation and Cost Analysis (RSER/EE/CA) document be developed to communicate decommissioning alternatives and the analysis used to select the Department's preferred alternative. The RSER/EE/CA documents are presented to regulators and other stakeholders in order to solicit feedback on the preferred alternative.

As was detailed in the *Environmental Bulletin* Vol 17, No. 2, the RSER/EE/CA for 211-3F Waste Truck Unloading Shed has completed the regulator comment and review process as well as the public comment and review period. No public comments were received. An Action Memorandum was issued on January 9, 2006 to document the selection of the preferred alterative and includes a responsiveness summary that addresses comments received from the United States Environmental Protection Agency, Region 4 (EPA-4) and South Carolina Department of Health and Environmental Control (SCDHEC). Decommissioning activities are complete. The Removal Action Report is anticipated to be issued in April 2007.

The RSER/EE/CA for 221-1F A-Line has completed the regulator comment and review process as well as the public comment and review period. No public comments were received. The Action Memorandum was issued on May 30, 2006. The DOE decided to postpone action at this facility.

The RSER/EE/CA for the 211-F Outside Facilities has completed the regulator comment and review process. The document was transmitted to EPA-4 and SCDHEC on March 23, 2006 with final comments received on May 3, 2006. Following disposition of regulator comments, the document was forwarded for public review and comment in June 2006. The Action Memorandum will be issued in February 2007. The DOE has decided to separate a part of the 211-F Facility, specifically the 805 and 820 Cells. These two cells will be the subject of a separate EE/CA to be issued in the spring.

Status of D&D Facilities as of November 30, 2006

The tables below summarize decommissioning activities through November 30, 2006. Table 1 provides decommissioning waste disposal volumes and Table 2 provides the total number of facilities decommissioned.

Table 1: Waste Disposal Volumes through November 30, 2006

Low Level Waste	2,212,300 cu. ft.	On-site
Sanitary Waste	3,289,100 cu. ft.	3-Rivers/C&D
Mixed Waste	7,000 cu. ft.	Off-site
Hazardous Waste	6,400 cu. ft.	Off-site
PCB Waste	5,700 cu. ft.	Off-site

Table 2: Facilities Decommissioned through November 2006

Simple Model	169
Integrated Sampling Model	68
EE/CA Model	1
Total	238

Since May 15, 2006, the SCDHEC, EPA, and DOE have reviewed the Facilities Decommissioning Evaluations for the following facilities, for which decommissioning has been completed.

Integrated Sampling Model Buildings:

904-86G, Containment Tank Inside Retention Basin - The Containment Tank was located on a concrete slab inside of the 50 million gallon earthen Retention Basin, 904-86G. The Tank was constructed in 1979 and its capacity was 500,000 gallons. It served as a back-up to store containment water from the Building 105-P. It never received water from an emergency; however in the mid-1980's, the tank received process sewer back-up from Building 105-P so had a potential to be radioactively contaminated. It was demolished to the concrete slab.

Simple Model Buildings

714-A, Spare Machinery Storage - The Spare Machinery Storage building was constructed in the early 1950's for storage of miscellaneous tools and equipment. It was a 45,750 square feet, single-story structure on a reinforced concrete raised slab foundation. The building was constructed of a concrete with asbestos cement board (transite) siding, and a concrete roof. The building was demolished to the raised concrete slab.

724-5A, E&I Vehicle Storage Shed - The E&I Vehicle Storage Shed was constructed in 1985. The facility was used for storage of vehicles and a repair area for vehicles and equipment. The building is an open bay structure which is constructed of metal structural members on a concrete slab with corrugated aluminum siding and roof. The building dimensions are 60'x 50'. The building has been deactivated and turned over to the Savannah River Regional Diversification Initiative (SRRDI) for reuse off site.

285-2F, Fire Protection Deluge Building - The Fire Protection Deluge Building was a 121 square foot, single-story structure built in 1964. The building was a lightweight, prefabricated, steel-framed structure with metal siding and roof, anchored to a concrete slab. The building housed the 285-F Cooling Tower fire protection sprinkler system deluge valves, instrumentation, two small air pumps, and a fire protection system panel. The building was demolished to the concrete slab.

719-F, Regulated Change House for Cooling Tower - The Regulated Change House for Cooling Tower was a 192 square foot, single-story structure built in 1963. The building was a light, steel-framed structure with metal siding and roof, constructed on a concrete slab. The building served as a personal protective equipment change facility to support periodic maintenance work on the 285-F Cooling Tower. The building was demolished to the concrete slab.

183-4K, Clarification Plant – The Clarification Plant was a steel frame building with exterior transite siding and interior transite wall board with a built-up concrete roof on a concrete slab on grade. The ground floor encompassed 2,934 square feet with an additional 1,240 square feet of second floor area. Built in the early to mid-1950s, it housed a water analysis laboratory and chemical storage/distribution area. The building was demolished to the concrete slab.

607-1P, Sanitary Lift Station - The Sanitary Lift Station was a circular concrete basin approximately six feet in diameter and ten feet deep. Sanitary waste flowed into the lift station by gravity. Two three-horsepower submersible pumps with associated piping and controls lifted the waste to an equalization basin, Building 607-24P. Equipment was removed and the basin was filled with gravel.

607-7P, Sanitary Treatment Facility – The Sanitary Treatment Facility was a packaged sanitary waste treatment facility (Clow Manufacturing Aer-O-Flo). It was installed in the late 1970's to treat sanitary waste from facilities in P Area. It was a below-ground, carbon steel basin measuring approximately 10 feet wide by 30 feet long by 11 feet deep. It employed two aeration blowers and a spray pump to aerate the sanitary waste. Equipment was removed and the basin was filled with gravel.

607-23P, Sewage Treatment Plant - The Sewage Treatment Plant consisted of a 10ft. wide by 28ft. long by 11ft. deep 10,000 gallon per day package treatment unit, and a 5ft. wide by 8ft. long concrete blower pad with two blowers, located on the North side of the basin. It was installed in P Area in 1985. The equipment has been removed and the basin filled with gravel.

MAILING LIST

Name _____

e-mail address _____

mailing address _____

_____

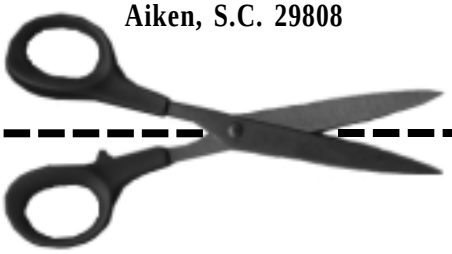
____Add to mail list

____Remove from mail list

____Correct my address

Mail to:

SRS Environmental Bulletin
Savannah River Site
Building 730-1B
Aiken, S.C. 29808



The SRS Environmental Bulletin

For more information on this or other environmental and compliance activities at SRS, please contact:

Jim Moore	**Paul Sauerborn**
Washington	**Washington**
Savannah River Co.	**Savannah River Co.**
Aiken, S.C. 29808	**Aiken, S.C. 29808**
(803) 952-6245	**(803) 952-6658**
e-mail: jim02.moore@srs.gov	paul.sauerborn@srs.gov

The SRS Environmental Bulletin
Savannah River Site
Building 730-1B
Aiken, S.C. 29808